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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/678,480	10/02/2000	Luis Aldaz	us 008631	6192

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NXP, B.V.
NXP INTELLECTUAL PROPERTY DEPARTMENT
M/S41-SJ
1109 MCKAY DRIVE
SAN JOSE, CA 95131

EXAMINER	
ODOM, CURTIS B	
ART UNIT	**PAPER NUMBER**
2611	

NOTIFICATION DATE	DELIVERY MODE
11/13/2008	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

ip.department.us@nxp.com

Office Action Summary	Application No.	Applicant(s)	
	09/678,480	ALDAZ ET AL.	
	Examiner	Art Unit	
	CURTIS B. ODOM	2611	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *10 October 2008*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-9,11,13-27,29,31-45,47 and 49-54* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-9, 11, 13-27, 29, 31-45, 47,and 49-54* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Response to Arguments

1. Applicant's arguments filed 10/10/2008 have been fully considered but they are not persuasive. Applicant states (see pages 15-16 of the Remarks) **"Independent claim 1 is amended as shown to include recitations from its former dependent claims 10 and 12, with claims 10 and 12 now canceled herein without prejudice. More particularly, claim 1 as amended herein recites, *inter alia,* "determining a time period over which said signal-strength of said finger assignment satiates said second signal-strength threshold" and "wherein said finger assignment is allowed to be deassigned if said time period fails to satiate a time threshold."**

These amendments to claim 1 correspond to the embodiment described, for example, on page *15,* line 10 *et seq.* with reference to Figure 3 of the present application. There is provided a "time period" over which the "signal-strength of said finger assignment satiates said second signal-strength threshold" and therefore the finger assignment may be prevented from being deassigned. However, claim 1 adds the condition that the finger assignment is allowed to be deassigned if the time period (over which the signal-strength of said finger assignment satiates said second signal-strength threshold) fails to satiate a "time threshold." Such features and other disclosed features are intended to prevent perturbations in the signal from causing unnecessary assignment or unnecessary deassignment. Stated in another way, even though the signal-strength might be "higher"

than the second signal-strength threshold during the time period, such a "higher" signal-strength in and of itself is not sufficient to prevent deassigment if that time period is too short (shorter than the time threshold). Therefore, a mere momentary upward "spike" in the signal-strength above the second-signal strength threshold will not be sufficient to prevent deassignment.

It is respectfully submitted that the cited references do not meet the limitations of claim 1 that require "determining a time period over which said signal-strength of said finger assignment satiates said second signal-strength threshold" and "wherein said finger assignment is allowed to be deassigned if said time period fails to satiate a time threshold."

However, it is the understanding of the Examiner that Bi et al. (U. S. Patent No. 6, 515, 977) does disclose **"determining a time period over which said signal-strength of said finger assignment satiates said second signal-strength threshold" and "wherein said finger assignment is allowed to be deassigned if said time period fails to satiate a time threshold."**

Bi et al. determines a time period during a time interval which the signal strength (quality) spends below a threshold (see column 9, lines 33-59), which in effect also measures the amount of time the finger spends above (or satiates) the threshold (which is the amount of time in the interval the signal quality is not below the threshold). If the time spent below the threshold is too long the finger is deassigned. However, if the time spent below the signal quality threshold is below the time threshold, the finger remains assigned (see column 10, lines 4-7). It is the understanding of the Examiner that when the signal quality is not below the threshold, it is above the threshold, thus, the signal remains assigned when the signal quality is above the threshold for a given amount of the time during the time interval (wherein when the

signal is above the signal quality threshold, the signal quality can not be below the signal quality threshold, and thus can not meet the time threshold to be deassigned and therefore remains assigned as disclosed in column 10, lines 4-7). Thus, if the signal quality is not above the signal quality threshold for a given amount of the time (or is below the threshold for a given amount of time), the finger is deassigned. Therefore, although Bi et al. does not specifically disclose **"determining a time period over which said signal-strength of said finger assignment satiates said second signal-strength threshold" and "wherein said finger assignment is allowed to be deassigned if said time period fails to satiate a time threshold", Bi et al. does disclose measuring a time period during a time interval which the signal strength (quality) spends below a threshold (see column 9, lines 33-59), which in effect also measures the amount of time the finger spends above the threshold (which is the amount of time in the interval the signal quality is above the threshold, and based on the time in which the signal spends above or below the signal quality threshold as compared to a time threshold during the time interval, the finger is de-assigned. Therefore, it is the understanding of the Examiner, Bi et al. reads on these limitations.**

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. Claims 1-9, 11, 13, 14 and 16-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Daudelin (previously cited in Office Action 6/1/2004) in view of Bi et al. (previously cited in Office Action 4/25/2006).

Regarding claim 1, Daudelin discloses a method of managing fingers for multipath signals in a wireless communication device (Fig. 4), the method comprising the steps of:

receiving (Fig. 4, block 401, column 4, lines 15-22) the multipath signals at the wireless communication device;

acquiring (Fig. 4, block 411, column 4, lines 33-40) one the multipath signals in a searcher portion of the wireless communication device;

determining (column 4, line 65-column 5, line 3) a SNR level of the one of the multipath signals, wherein determining a constituent signals includes a signal quality measurement (including SNR) to identify a constituent signal (column 2, lines 5-45);

evaluating (Fig. 6, column 7, lines 24-50) the one of the multipath signals for categorization into one of a plurality of states using at least one SNR threshold, wherein the states are as follows: 1) the signal quality is above an assignment or re-establishment threshold; 2) the signal quality is below a de-assignment threshold; and 3) the signal quality is below an assignment or re-establishment threshold, but above a de-assignment threshold and wherein the threshold is based on signal quality which can be SNR (see column 2, lines 5-19), therefore making the threshold an SNR threshold;

generating (Fig. 4, blocks 404 and 411, column 6, lines 44-49) a finger assignment by selectively providing the one of the multipath signals for a demodulation operation based upon its state

receiving (Fig. 4, block 404 and 411, column 4, line 65-column 5, line 45) the finger assignment from the searcher portion of the communication device;

determining (column 5, lines 4-7) a signal-strength of the finger assignment, wherein signal quality is a measure of signal strength (column 2, lines 12-15);

enabling (Fig. 4, block 404, column 6, lines 36-49 and Fig. 6, column 7, lines 29-42) the finger assignment for a combine operation if the signal strength for the finger assignment satiates a first signal-strength threshold (re-establishment threshold), wherein re-entering the assigned state enables the finger assignment for a combine operation (column 5, lines 4-7).

Daudelin does not disclose preventing the finger assignment from being deassigned if the signal strength of the finger assignment satiates a second threshold, the second signal-strength threshold being less that the first signal-strength threshold; and determining a time period over which the signal-strength of the first assignment satiates the second signal-strength threshold, and wherein the finger assignment is allowed to be deassigned if the time period fails to satiate at time threshold.

However, Bi et al. discloses isolating high quality signals to demodulate and combining them to estimate the transmitted signal using a finger assignor (see column 2, lines 47-62). The finger assignor searches for strong signals and assigns them to a finger of a rake receiver for combination (see column 6, lines 6-9). In Fig. 6 of Bi et al., a first signal strength (quality) threshold for which the finger assignment must satisfy in order not to be de-assigned and remain enabled for a combine operation (see column 6, lines 63-67) is depicted as R_1+R_2. Bi et al. further discloses (see Fig. 7) decreasing (see column 6, line 63-column 7, line 9) the first threshold (R_1) to a plurality of second thresholds (R_2, R_3) less than R_1, wherein as along as the

signal satisfies these thresholds as shown in Fig. 7, the signal is prevented from being de-assigned (see column 7, lines 10-20). Bi et al. also discloses measuring a time period during a time interval which the signal strength (quality) spends below a threshold (see column 9, lines 33-59), which in effect also measures the amount of time the finger spends above the threshold (which is the amount of time in the interval the signal quality is above the threshold, and based on the time in which the signal spends above or below the signal quality threshold as compared to a time threshold during the time interval, the finger is de-assigned.

Therefore, it would have been obvious to one skilled in the art at the time the invention was made to modify the method/device of Daudelin with the teachings of Bi et al. in order to prevent fingers from being deassigned since Bi et al. states preventing some fingers from being deassigned can enable the receiver to produce a higher quality estimate of the signal (column 4, lines 2-14).

Regarding claim 2, which inherits the limitations of claim 1, Daudelin discloses the plurality of states includes three hierarchical states (Fig. 6, column 7, lines 24-50), wherein the states are as follows: 1) the signal quality is above an assignment or re-establishment threshold; 2) the signal quality is below a de-assignment threshold; and 3) the signal quality is below an assignment or re-establishment threshold, but above a de-assignment threshold.

Regarding claim 3, which inherits the limitations of claim 1, Daudelin discloses the plurality of states includes an assigned state, wherein the signals associated with the assigned state are used for an active demodulation (column 5, lines 4-7), wherein in the assigned state the signal quality is above an assignment or re-establishment threshold (column 7, lines 24-50).

Regarding claim 4, which inherits the limitations of claim 1, Daudelin discloses the plurality of states includes a potential state, wherein the signals associated with the potential state are not actively used for an active demodulation operation, but which may likely be candidates for a future demodulation operation (Fig. 6, column 7, lines 30-37), wherein in the potential state, the signal quality is below an assignment or re-establishment threshold, but above a de-assignment threshold as increasing towards a an assignment or re-establishment threshold.

Regarding claim 5, which inherits the limitations of claim 1, Daudelin discloses the plurality of states includes a temporary state, wherein the signals associated with the temporary state are not actively used for an active demodulation operation, but which may likely be candidates for categorization in a potential state in a future evaluation (Fig. 6, column 7, lines 30-34), wherein in a temporary state the signal quality is below a de-assignment threshold.

Regarding claim 6, which inherits the limitations of claim 1, Daudelin discloses the multipath signal is categorized into a state according to SNR level of the multipath signal (column 7, lines 24-50), wherein signal quality can be SNR (column 2, lines 12-15).

Regarding claim 7, which inherits the limitations of claim 1, Daudelin discloses the multipath signal is categorized into a state according to a time period over which the SNR level of the multipath signal exists (Fig. 6, column 7, lines 24-50).

Regarding claim 8, which inherits the limitations of claim 3, Daudelin discloses enabling the multipath signal for demodulation if it is categorized in the assigned state (column 5, lines 4-7), wherein in the assigned state the signal quality is above an assignment or re-establishment threshold (column 7, lines 24-50).

Regarding claim 9, Daudelin and Bi et al. do not spefically disclose the first five steps of claim 1 are repeated to provide a quantity of multipath signals at least equivalent to a number of fingers in a receive portion of the wireless communication device. However, Daudelin discloses the more signals (multipath signals) used for demodulation operation (step 5 of claim 1), the better the estimate of the transmitted signal in the receiver (column 2, lines 36-42). Bi et al. also discloses the more constituent signals obtained as oppose to spurious signals obtained results in a higher quality estimate of the transmitted signal (see Bi et al., column 4, lines 2-14). Therefore, it would have been obvious to one skilled in the art at the time the invention was made to modify the method/device of Daudelin and Bi et al. to provide a quantity of multipath signals at least equivalent to a number of fingers in a receive portion of the wireless communication device in order to generate a high quality estimate of the transmitted signal (see Bi et al., column 4, lines 2-14)

Regarding claim 11, which inherits the limitations of claim 10, Bi et al. discloses preventing the finger assignment from being deassigned if the time period satiates a time threshold (column 9, line 44-column 10, line 6), wherein the finger is prevented from being deassigned if the time period at which the finger's strength is above a threshold satiates the time (threshold) at which the finger's strength is below a threshold.

It would have been obvious to one skilled in art to include this feature since preventing a finger from being deassigned which can enable the receiver to produce a higher quality estimate of the signal (see Bi et al., column 4, lines 2-14).

Regarding claim 13, which inherits the limitations of claim 1, Bi et al. further discloses allowing the finger assignment to be de-assigned if the finger assignment fails to satiate the second signal-strength threshold (column 9, lines 60-65).

It would have been obvious to one skilled in art to include this feature since allowing finger to be deassigned can enable the receiver to produce a higher quality estimate of the signal (see Bi et al., column 4, lines 2-14).

Regarding claim 14, which inherits the limitations of claim 1, Daudelin discloses demodulating the finger assignment (column 5, lines 4-7).

Regarding claim 16, which inherits the limitations of claim 1, Daudelin discloses categorizing the finger assignment into one of a plurality of states based upon the signal-strength of the finger assignment (column 7, lines 24-50), wherein the states are assigned, reserved, and inactive.

Regarding claim 17, which inherits the limitations of claim 10, Daudelin further discloses categorizing the finger assignment into one of a plurality of states based upon the signal-strength of the finger assignment and based upon the time period over which the signal strength exists (column 7, lines 24-50).

Regarding claim 18, which inherits the limitations of claim 16, Daudelin discloses evaluating the finger assignment for the combine operation or for de-assignment based upon its state (column 5, lines 4-7 and 36-56).

4. Claim 15 is rejected under 35 U.S.C. 103(a) as being unpatentable over Daudelin (previously cited in Office Action 6/1/2004) in view of Bi et al. (previously cited in Office

Action 4/25/2006) as applied to claims 1-9, 11, 13, 14, and 16-18, and in further view of Karlsson et al. (previously cited in Office Action 4/25/2006).

Regarding claim 15, Daudelin and Bi et al. do not disclose filtering the signal strength of the finger assignment as determined in the signal-strength determining step.

However, Karlsson et al. discloses filtering signal strength measurements using an adaptation filter (column 7, lines 16-30). Therefore, it would have been obvious to one skilled in the art at the time the invention was made to modify the method/device of Daudelin and Bi et al. with the teachings of Karlsson et al. since Karlsson et al. states filtering can provide measurements absent of temporary fluctuations caused by the system in which the measurement is performed (column 9, line 65-column 10, line 4).

5. Claims 19-27, 29, 31, 32, 34-45, 47, 49, 50, and 52-54 are rejected under 35 U.S.C. 103(a) as being unpatentable over Daudelin (previously cited in Office Action 6/1/2004) in view of Bi et al. (previously cited in Office Action 4/25/2006) as applied to claims 1-14 and 16-18, and in further view of Langberg et al. (previously cited in Office Action 6/1/2004).

Regarding claim 19, Daudelin a wireless communication device (Fig. 4) for managing multipath signals and for managing finger assignment, the communication device comprising:

a searcher (Fig. 4, block 411) adapted to scan for multipath signals;

a transceiver coupled to the searcher (Fig. 4, block 407);

a processor (column 4, block 404), the processor coupled to the searcher; and

a device (Fig. 4, block 400) to perfoms the steps of:

receiving (Fig. 4, block 401, column 4, lines 15-22) the multipath signals at the wireless communication device;

acquiring (Fig. 4, block 411, column 4, lines 33-40) one the multipath signals in a searcher portion of the wireless communication device;

determining (column 4, line 65-column 5, line 3) a SNR level of the one of the multipath signals, wherein determining a constituent signals includes a signal quality measurement (including SNR) to identify a constituent signal (column 2, lines 5-45);

evaluating (Fig. 6, column 7, lines 24-50) the one of the multipath signals for categorization into one of a plurality of states using at least one SNR threshold, wherein the states are as follows: 1) the signal quality is above an assignment or re-establishment threshold; 2) the signal quality is below a de-assignment threshold; and 3) the signal quality is below an assignment or re-establishment threshold, but above a de-assignment threshold and wherein the thresholds are based on signal quality which can be SNR (see column 2, lines 5-19), therefore making the threshold an SNR threshold;

generating (Fig. 4, blocks 404 and 411, column 6, lines 44-49) a finger assignment by selectively providing the one of the multipath signals for a demodulation operation based upon its state

receiving (Fig. 4, block 404 and 411, column 4, line 65-column 5, line 45) the finger assignment from the searcher portion of the communication device;

determining (column 5, lines 4-7) a signal-strength of the finger assignment, wherein signal quality is a measure of signal strength (column 2, lines 12-15);

enabling (Fig. 4, block 404, column 6, lines 36-49 and Fig. 6, column 7, lines 29-42) the finger assignment for a combine operation if the signal strength for the finger assignment satiates a first signal-strength threshold (re-establishment threshold), wherein re-entering the assigned

state enables the finger assignment for a combine operation (column 5, lines 4-7);

Daudelin does not disclose preventing the finger assignment from being deassigned if the signal strength of the finger assignment satiates a second threshold, the second signal-strength threshold being less that the first signal-strength threshold; and determining a time period over which the signal-strength of the first assignment satiates the second signal-strength threshold, and wherein the finger assignment is allowed to be deassigned if the time period fails to satiate at time threshold.

However, Bi et al. discloses isolating high quality signals to demodulate and combining them to estimate the transmitted signal using a finger assignor (see column 2, lines 47-62). The finger assignor searches for strong signals and assigns them to a finger of a rake receiver for combination (see column 6, lines 6-9). In Fig. 6 of Bi et al., a first signal strength (quality) threshold for which the finger assignment must satisfy in order not to be de-assigned and remain enabled for a combine operation (see column 6, lines 63-67) is depicted as R_1+R_2. Bi et al. further discloses (see Fig. 7) decreasing (see column 6, line 63-column 7, line 9) the first threshold (R_1) to a plurality of second thresholds (R_2, R_3) less than R_1, wherein as along as the signal satisfies these thresholds as shown in Fig. 7, the signal is prevented from being de-assigned (see column 7, lines 10-20). Bi et al. also discloses measuring a time period during a time interval which the signal strength (quality) spends below a threshold (see column 9, lines 33-59), which in effect also measures the amount of time the finger spends above the threshold (which is the amount of time in the interval the signal quality is above the threshold, and based on the time in which the signal spends above or below the signal quality threshold as compared to a time threshold during the time interval, the finger is de-assigned.

Therefore, it would have been obvious to one skilled in the art at the time the invention was made to modify the method/device of Daudelin with the teachings of Bi et al. in order to prevent fingers from being deassigned since Daudelin Bi et al. states preventing some fingers from being deassigned can enable the receiver to produce a higher quality estimate of the signal (column 4, lines 2-14).

Langberg et al. teaches that the method and apparatus for a transceiver warm start activation procedure with precoding can be implemented in software stored in a computer-readable medium. The computer readable medium is an electronic, magnetic, optical, or other physical device or means that can contain or store a computer program for use by or in connection with a computer-related system or method (note column 3, lines 51-65). One skilled in the art at the time the invention was made would have clearly recognized that the method of Daudelin and Bi et al. would have been implemented into software. The implemented software would perform the same function of the hardware for less expense, greater adaptability, and greater flexibility. Therefore, it would have been obvious to have used the software in Daudelin and Bi et al. as taught by Langberg et al. in order to reduce cost and improve the adaptability and flexibility of the communication system.

Regarding claims 20-27, 29, 31, 32 and 34-36, which depend on claim 19, the claimed device includes features corresponding to the above rejection of claims 2-9, 11, 13, 14 and 16-18 which is applicable hereto.

Regarding claims 37-45, 47, 49, 50, and 52-54, Daudelin and Bi et al. discloses all of the subject matter as described in the previous rejection (see rejection of claims 1-9, 11, 13, 14, and

16-18), except for the method written as a computer program product with a computer readable storage medium.

However, Langberg et al. teaches that the method and apparatus for a transceiver warm start activation procedure with precoding can be implemented in software stored in a computer-readable medium. The computer readable medium is an electronic, magnetic, optical, or other physical device or means that can contain or store a computer program for use by or in connection with a computer-related system or method (note column 3, lines 51-65). One skilled in the art at the time the invention was made would have clearly recognized that the method of Daudelin would have been implemented into software. The implemented software would perform the same function of the hardware for less expense, greater adaptability, and greater flexibility. Therefore, it would have been obvious to have used the software in Daudelin and Bi et al. as taught by Langberg et al. in order to reduce cost and improve the adaptability and flexibility of the communication system.

6. Claims 33 and 51 are rejected under 35 U.S.C. 103(a) as being unpatentable over Daudelin (previously cited in Office Action 6/1/2004) in view of Bi et al. (previously cited in Office Action 4/25/2006) and in view of Langberg (previously cited in Office Action 6/1/2004) as applied to claims 19-32, 34-50 and 52-54, and in further view of Karlsson et al. (previously cited in Office Action 4/25/2006).

Regarding claims 33 and 51, Daudelin, Bi et al., and Langberg et al. do not disclose filtering the signal strength of the finger assignment as determined in the signal-strength determining step.

However, Karlsson et al. discloses filtering signal strength measurements using an adaptation filter (column 7, lines 16-30). Therefore, it would have been obvious to one skilled in the art at the time the invention was made to modify the method/device of Daudelin, Bi et al., and Langberg et al. with the teachings of Karlsson et al. since Karlsson et al. states filtering can provide measurements absent of temporary fluctuations caused by the system in which the measurement is performed (column 9, line 65-column 10, line 4).

Conclusion

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to CURTIS B. ODOM whose telephone number is (571)272-3046. The examiner can normally be reached on Monday- Friday, 9-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Shuwang Liu can be reached on 571-272-3036. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Curtis B. Odom/
Primary Examiner, Art Unit 2611
November 8, 2008

Application Number	Application/Control No.	Applicant(s)/Patent under Reexamination	
	09/678,480	ALDAZ ET AL.	
	Examiner	Art Unit	
	CURTIS B. ODOM	2611	